# FIG. 1A

```
              ┌ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ 1 ─ ─ ─ ─ ─ ─ ─ ─ ─ ┐
              │   ┌───────┐   ┌────────────┐   ┌────────┐  │
  ┌────────┐  │   │  11   │   │     12     │   │  13    │  │   ┌───────────┐
  │ CLEAR  │  │   │ INPUT │──▶│ ENCRYPTION │──▶│ OUTPUT │  │──▶│ ENCRYPTED │
  │MAP DATA│──┼──▶│       │   │            │   │        │  │   │ MAP DATA  │
  └────────┘ 3│   └───────┘   └────────────┘   └────────┘  │   └───────────┘ 5
              └ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ┘
```

# FIG. 1B

```
                 ┌ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ 2 ─ ─ ─ ─ ─ ─ ─ ─ ─ ┐
                 │   ┌───────┐   ┌────────────┐   ┌────────┐  │
  ┌───────────┐  │   │  21   │   │     22     │   │  23    │  │   ┌─────────────┐
  │ ENCRYPTED │  │   │ INPUT │──▶│ DECRYPTION │──▶│ OUTPUT │  │──▶│ APPLICATION │
  │ MAP DATA  │──┼──▶│       │   │            │   │        │  │   │             │ 7
  └───────────┘ 5│   └───────┘   └────────────┘   └────────┘  │   └─────────────┘
                 └ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ─ ┘
```
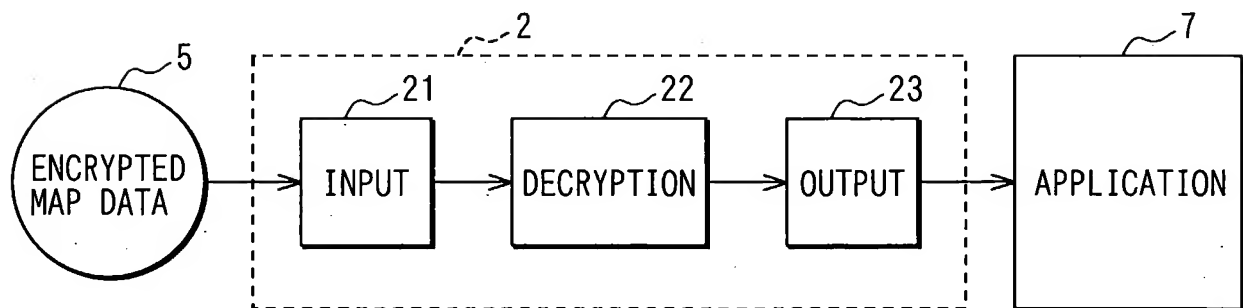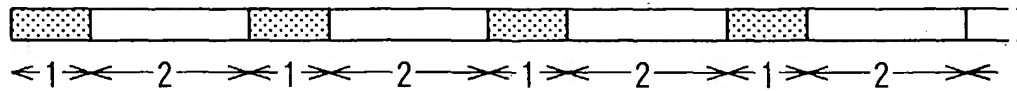
# FIG. 2A



ENCRYPTED = ▨▨▨▨    CLEAR = ▭

# FIG. 2B

[ENCRYPTION RATIO PATTERN]
    P1=50%
    P2=25%
    P3=75%
[REPEAT COUNT]: 2



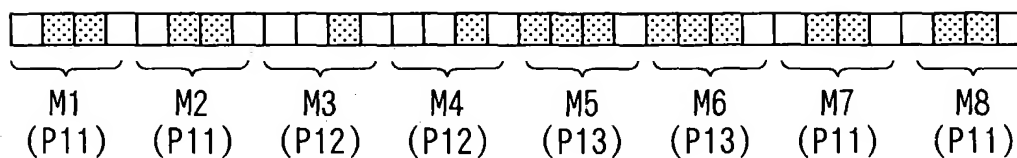| M1 | M2 | M3 | M4 | M5 | M6 | M7 | M8 |
| (P1) | (P1) | (P2) | (P2) | (P3) | (P3) | (P1) | (P1) |
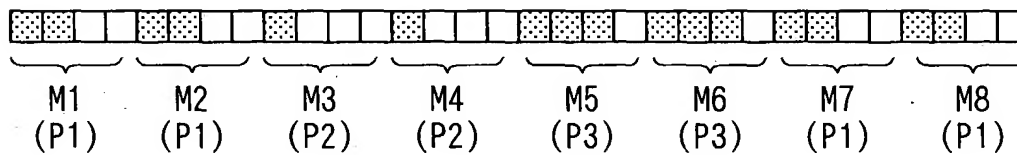
ENCRYPTED = ▨▨▨▨    CLEAR = ▭

# FIG. 2C

[ENCRYPTION RATIO PATTERN]
    P11=FM 25% BY 50%
    P12=FM 50% BY 25%
    P13=FM 0% BY 75%
[REPEAT COUNT]: 2



| M1 | M2 | M3 | M4 | M5 | M6 | M7 | M8 |
| (P11) | (P11) | (P12) | (P12) | (P13) | (P13) | (P11) | (P11) |

ENCRYPTED = ▨▨▨▨    CLEAR = ▭